

SYSTEM AND METHOD FOR STEERING A MULTI-WHEEL
DRIVE VEHICLE

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ABSTRACT

A system and method of controlling a multi-wheel drive vehicle is provided. The invention is preferably applicable to the steering of such a vehicle and determines the individual velocities for each wheel drive. In this regard, the invention includes two general steps. The first step includes determining the distance of each wheel drive and a vehicle velocity reference point from a turning reference point. The second step includes ratioing each wheel drive's distance from the turning reference point with the vehicle velocity reference point's distance from the turning reference point. The ratios are then applied to a vehicle velocity associated with the vehicle velocity reference point to determine the velocity of each respective wheel drive. Once determined, the velocities are output to each wheel drive.